

#0



SEQUENCE LISTING

<100> Russell, Stephen James
Cattaneo, Roberto
Peng, Kah-Whye
Schneider, Urs
Murphy, Anthea L.

<120> Therapeutic methods and compositions
using viruses of the recombinant paramyxoviridae family

<130> 07039-298001

<140> US 09/667,947

<141> 2000-09-22

<150> US 60/155,873

<151> 1999-09-24

<160> 49

<170> FastSEQ for Windows Version 4.0

<210> 1

<211> 4

<212> PRT

<213> Artificial Sequence

<220>

<223> Factor Xa cleavage site

<400> 1

Ile Glu Gly Arg

1

<210> 2

<211> 4

<212> PRT

<213> Artificial Sequence

<220>

<223> Furin cleavage site

<220>

<221> VARIANT

<222> 2

<223> Xaa = Any 20 amino acids

<400> 2

Arg Xaa Lys Arg

1

<210> 3

<211> 6

<212> PRT

<213> Artificial Sequence

<220>

<223> MMP cleavage site

B1

<400> 3
 Pro Leu Gly Leu Trp Ala
 1 5

<210> 4
 <211> 6
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Caspase-1 cleavage site
 <400> 4
 Tyr Glu Val Asp Gly Trp
 1 5

<210> 5
 <211> 7
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Caspase-2 cleavage site
 <400> 5
 Val Asp Val Ala Asp Gly Trp
 1 5

<210> 6
 <211> 7
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Caspase-3 cleavage site
 <400> 6
 Val Asp Gln Met Asp Gly Trp
 1 5

<210> 7
 <211> 6
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Caspase-4 cleavage site
 <400> 7
 Leu Glu Val Asp Gly Trp
 1 5

<210> 8
 <211> 6
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Caspase-6 cleavage site
 <400> 8
 Val Gln Val Asp Gly Trp
 1 5

<210> 9
 <211> 7
 <212> PRT

B1
 Out

<213> Artificial Sequence

<220>

<223> Caspase-7 cleavage site

<400> 9

Val Asp Gln Val Asp Gly Trp

1

5

<210> 10

<211> 4

<212> PRT

<213> Artificial Sequence

<220>

<223> Proprotein convertase cleavage site

<400> 10

Arg Gly Leu Thr

1

<210> 11

<211> 17

<212> PRT

<213> Artificial Sequence

<220>

<223> FMDV protease 2A cleavage site

<400> 11

Asn Phe Asp Leu Leu Lys Leu Ala Gly Asp Val Glu Ser Asn Pro Gly

1

5

10

15

Pro

<210> 12

<211> 34

<212> PRT

<213> Paramyxoviridae

<220>

<223> H protein cytoplasmic tail

<400> 12

Met Ser Pro Gln Arg Asp Arg Ile Asn Ala Phe Tyr Lys Asp Asn Pro

1

5

10

15

His Pro Lys Gly Ser Arg Ile Val Ile Asn Arg Glu His Leu Met Ile

20

25

30

Asp Arg

<210> 13

<211> 33

<212> PRT

<213> Paramyxoviridae

<220>

<223> F protein cytoplasmic tail

<400> 13

Arg Gly Arg Cys Asn Lys Lys Gly Glu Gln Val Gly Met Ser Arg Pro

1

5

10

15

Gly Leu Lys Pro Asp Leu Thr Gly Thr Ser Lys Ser Tyr Val Arg Ser

20

25

30

Leu

Cont

<210> 14
 <211> 5
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Furin cleavage site
 <400> 14
 Arg Arg His Lys Arg
 1 5

<210> 15
 <211> 4
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Furin cleavage site
 <400> 15
 Arg His Lys Arg
 1

<210> 16
 <211> 47
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Primer
 <400> 16
 ttttcctttt gcggccgctt tcatcaacgc ttctgcaggg acccctc

47

<210> 17
 <211> 56
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Primer
 <400> 17
 gtccatgcgg cccagccggc ccgattaaag agagaggcag aggacctgca ggtggg

56

<210> 18
 <211> 18
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Amino acid sequence coded for by primer
 <400> 18
 Val His Ala Ala Gln Pro Ala Arg Leu Lys Arg Glu Ala Glu Asp Leu
 1 5 10 15
 Gln Val

<210> 19
 <211> 50
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Primer

<400> 19
 ttttcctttt gcggccgctt tcatcatcaa cgcttctgca gggacccctc 50

<210> 20

<211> 59

<212> DNA

<213> Artificial Sequence

<220>

<223> Primer

<400> 20

gtccatgcgg ccagccggc cggaggaggc gggtcagagg cagaggacct gcaggtggg 59

<210> 21

<211> 19

<212> PRT

<213> Artificial Sequence

<220>

<223> Amino acid sequence coded for by primer

<400> 21

Val His Ala Ala Gln Pro Ala Gly Gly Gly Ser Glu Ala Glu Asp
 1 5 10 15

Leu Gln Val

<210> 22

<211> 16

<212> PRT

<213> Paramyxoviridae

<220>

<223> F protein cytoplasmic tail

<400> 22

Arg Gly Arg Cys Asn Lys Lys Gly Glu Gln Gly Met Ser Arg Pro Gly
 1 5 10 15

<210> 23

<211> 9

<212> PRT

<213> Paramyxoviridae

<220>

<223> Cytoplasmic tail of FcΔ24 mutant

<400> 23

Arg Gly Arg Cys Asn Lys Lys Gly Glu
 1 5

<210> 24

<211> 26

<212> DNA

<213> Artificial Sequence

<220>

<223> Primer

<400> 24

aaaactgcag actcaaaggt caatgc 26

<210> 25

<211> 30

<212> DNA

<213> Artificial Sequence

B1
 Cont

<220>
 <223> Primer
 <400> 25
 cccttaatta atatacagat ctcaacggat 30

<210> 26
 <211> 31
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Primer
 <400> 26
 ccatcgataa tggccttcta caaagataac c 31

<210> 27
 <211> 33
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Primer
 <400> 27
 ccatcgataa tgagccatcc caagggagt agg 33

<210> 28
 <211> 33
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Primer
 <400> 28
 ccatcgataa tgaacagaga acatcttatg att 33

B1
 Cont
 <210> 29
 <211> 29
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Primer
 <400> 29
 ccatcgataa tcatggatgg tgatagggg 29

<210> 30
 <211> 31
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Primer
 <400> 30
 gcaaaacata aggggtgtca actttacttg a 31

<210> 31
 <211> 23
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Primer

<400> 31
gacacccctt atgttttgct ggc 23

<210> 32
<211> 32
<212> DNA
<213> Artificial Sequence
<220>
<223> Primer
<400> 32
gcttcaagta ggaaccacaa cagatttgcg gg 32

<210> 33
<211> 32
<212> DNA
<213> Artificial Sequence
<220>
<223> Primer
<400> 33
cccgcaaadc tggttggtt cctacttgaa gc 32

<210> 34
<211> 7
<212> PRT
<213> Artificial Sequence
<220>
<223> Furin cleavage site
<220>
<223> Primer
<400> 34
Arg His Lys Arg Phe Ala Gly
1 5

<210> 35
<211> 7
<212> PRT
<213> Artificial Sequence
<220>
<223> Furin cleavage site
<220>
<221> VARIANT
<222> 5
<223> Xaa = Phe or Leu
<221> VARIANT
<222> 6
<223> Xaa = Ala or Ile
<221> VARIANT
<222> 7
<223> Xaa = Gly or Ala
<400> 35
Arg His Lys Arg Xaa Xaa Xaa
1 5

<210> 36
<211> 21
<212> DNA
<213> Artificial Sequence

B1
Out

<220>
 <223> Primer
 <220>
 <221> VARIANT
 <222> 1
 <223> n = A, T, C, or G
 <221> VARIANT
 <222> 2
 <223> n = A, C, or T
 <221> VARIANT
 <222> 3
 <223> n = T or C
 <221> VARIANT
 <222> 4
 <223> n = A, T, C, or G
 <221> VARIANT
 <222> 5
 <223> n = A, C, or T
 <221> VARIANT
 <222> 6
 <223> n = T or C
 <221> VARIANT
 <222> 7
 <223> n = A, T, C, or G
 <221> VARIANT
 <222> 8
 <223> n = A, C, or T
 <221> VARIANT
 <222> 9
 <223> n = T or C
 <221> VARIANT
 <222> 10, 11, 12
 <223> n = A, T, C, or G
 <221> VARIANT
 <222> 15
 <223> n = A or C
 <221> VARIANT
 <222> 16
 <223> n = A or G
 <221> VARIANT
 <222> 17
 <223> n = C or T
 <221> VARIANT
 <222> 20
 <223> n = G or C
 <400> 36
 nnnnnnnnnnnntttnnnagnt

21

<210> 37
 <211> 4
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Factor Xa cleavage site
 <400> 37
 Ile Glu Gly Arg
 1

<210> 38
 <211> 17
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Primer
 <400> 38
 gcgcgctggc ccaggtg 17

<210> 39
 <211> 16
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Primer
 <400> 39
 tgcggccgcc cgtttc 16

<210> 40
 <211> 8
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Epitope tag
 <400> 40
 Asp Tyr Lys Asp Asp Asp Asp Lys
 1 5

<210> 41
 <211> 11
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Sequence of linker region
 <400> 41
 Ile Glu Gly Arg Ala Ala Gln Pro Ala Met Ala
 1 5 10

<210> 42
 <211> 33
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Fragment
 <400> 42
 atcgagggaa gggcggccca gccggccatg gcc 33

<210> 43
 <211> 11
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Synthetic
 <400> 43
 tagtaactag t 11

<210> 44
 <211> 59
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Synthetic
 <400> 44
 ccgggaagat ggaaccaatg cggcccagcc ggcctcaggt tcagcggccg catagtaga 59

<210> 45
 <211> 59
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Synthetic
 <400> 45
 ctagtctact atgcggccgc tgaacctgag gccggctggg ccgcattggg tccatcttc 59

<210> 46
 <211> 57
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Synthetic
 <400> 46
 ccgggaagat ggaaccaata tcgaggggaag ggcggcccag ccggcctcag gttcagc 57

<210> 47
 <211> 57
 <212> DNA
 <213> Artificial Sequence
 <220>
 <223> Synthetic
 <400> 47
 ggccgctgaa cctgaggccg gctgggcccgc ccttcctcag atattgggtc catcttc 57

<210> 48
 <211> 12
 <212> PRT
 <213> Paramyxoviridae
 <220>
 <223> C-terminal amino acids of H protein
 <400> 48
 Cys Thr Val Thr Arg Glu Asp Gly Thr Asn Arg Arg
 1 5 10

<210> 49
 <211> 7
 <212> PRT
 <213> Artificial Sequence
 <220>
 <223> Sequence of linker region
 <400> 49
 Ala Ala Gln Pro Ala Met Ala
 1 5
